Application Serial No. 10/749,450 Filing Date: December 31, 2003

Docket No. 1332

Page 2 of 6

## **AMENDMENTS TO THE CLAIMS**

This listing of claims replaces all prior versions of listing of claims, and listing of claims in the application.

## **Listing of Claims**

- 1. (Currently Amended) A liquid ionic compound comprising a cation which is a complex of a neutral ligand selected from the group consisting of organic substituted and unsubstituted alkyl amines and crown ethers with a metal ion selected from the group consisting of Na<sup>+</sup>, K<sup>+</sup>, Li<sup>+</sup>, Ca<sup>2+</sup>, Ag<sup>+</sup>, Zn<sup>2+</sup>, Cu<sup>2+</sup>, Cd<sup>2+</sup>, Ni<sup>2+</sup>, Hg<sup>2+</sup>, Co<sup>3+</sup> and Fe<sup>3+</sup> and an anion which is a conjugate anion of the metal ion, wherein said anion comprises sulfur or phosphorous said cation and said anion comprising a substantially new liquid.
- 2. (Previously Presented) An ionic compound according to claim 1 which is a liquid below 100°C.
- 3. (Previously Presented) An ionic compound according to claim 2 which is a liquid at room temperature.
- 4. (Previously Presented) An ionic compound according to claim 1 which is electrically conductive in the absence of a solvent.
- 5. (Previously Presented) An ionic liquid according to claim 1 which is hydrophobic.
- 6. (Previously Presented) An ionic compound according to claim 1 wherein said neutral organic ligand is a crown ether.
- 7. (Cancelled)

Application Serial No. 10/749,450 Filing Date: December 31, 2003

Docket No. 1332 Page 3 of 6

7

- (Previously Presented) An ionic compound according to claim 1 wherein said conjugate anion is bis(trifluoromethane)sulfonimide, boron trifluoride, nitrate, sulfate, phosphate, hexafluorophosphate and dicyanamide.
- (Currently Amended) A method for forming a substantially neat ionic liquid ionic compound, the method comprising mixing a neutral ligand selected from the group consisting of organic substituted and unsubstituted alkyl amines and crown ethers with a metal ion selected from the group consisting of Na<sup>+</sup>, K<sup>+</sup>, Li<sup>+</sup>, Ca<sup>2+</sup>, Ag<sup>+</sup>, Zn<sup>2+</sup>, Cu<sup>2+</sup>, Cd<sup>2+</sup>, Ni<sup>2+</sup>, Hg<sup>2+</sup>, Co<sup>3+</sup> and Fe<sup>3+</sup> and with the salt of a metal cation and its conjugate anion at room temperature.
- 10. (Original) A method according to claim, 9 wherein said neutral organic ligand is a crown ether.
- (Original) A method according to claim 10 wherein the metal cation is selected from the group consisting of sodium, potassium, lithium and calcium.
- 12. (Cancelled)

6/11/2009

- 13. (Original) A method according to claim 12 wherein said metal cation is selected from the group consisting of silver, zinc, copper, cadmium, nickel, mercury and iron.
- 14. (Previously Presented) A method according to claim 9 wherein said conjugate anion is bis(trifluoromethane)sulfonimide, boron trifluoride, nitrate, sulfate, phosphate, hexafluorophosphate and dicyanamide.
- 15.-20. (Cancelled)